after defoliation of prairie grass (*Bromus catharticus* Vahl) 52
JOHNSON R.H. and MORRISON J. Effects of spring fertilizer nitrogen and sward height on production from perennial ryegrass/white clover swards grazed by beef cattle 322
JONES J.R. *see* MAXWELL T.J.
JOOST R.E. *see* VENUTO B.C.

KEMP P.D. *see* LI G.D.
KILPATRICK D.J. *see* PATTERSON D.C.
KILPATRICK D.J. *see* WRIGHT D.A.
KNIGHT A.C. *see* WU L.

LI G.D., KEMP P.D. and HODGSON J. Regrowth, morphology and persistence of Grasslands Puna chicory (*Cichorium intybus* L.) in response to grazing frequency and intensity 33
LINDNER R. and GARCIA A. Genetic differences between natural populations of diploid and tetraploid *Dactylis glomerata* ssp. *izcoi* 291
LOUAULT F., CARRÈRE P. and SOUSSANA J.F. Efficiencies of ryegrass and white clover herbage utilization in mixtures continuously grazed by sheep 388
LOWE J.F. *see* WILLIAMS A.G.

MCGECHAN M.B. *see* WU L.
MACKAY A.D. *see* NIE Z.N.
MCQUEEN R.E. *see* CHARMLEY E.
MARRIOTT C.A., BOLTON G.R. and DUFF E.I. Factors affecting the stolon growth of white clover in ryegrass/clover patches 147
MARRIOTT C.A., FISHER J.M., HOOD K.J. and SMITH M.A. Persistence and colonization of gaps in sown swards of grass and clover under different sward managements 156
MAXWELL T.J., SIBBALD A.R., JONES J.R., MUNRO J.M.M. and REES M.E. The implications of controlling grazed sward height for the operation and productivity of upland sheep systems in the UK. 3. The effect of choice of genotype, level of nitrogen fertilizer and lamb:ewe ratio 258
MAYNE C.S. *see* PATTERSON D.C.
MORRISON J. *see* JOHNSON R.H.
MUCK R.E. *see* VAGNONI D.B.
MUNRO J.M.M. *see* MAXWELL T.J.

NIE Z.N., MACKAY A.D., BARKER D.J., VALENTINE I. and HODGSON J. Changes in plant population density, composition and sward structure of a hill pasture during a pastoral fallow 190
NUTHALL R. *see* GIBB M.J.

O'DONNELL C., WILLIAMS A.G. and BIDDLESTONE A.J. The effects of pressure and stage of ensilage on the mechanical properties and effluent production potential of grass silage 12
O'DONNELL C., WILLIAMS A.G. and BIDDLESTONE A.J. The effects of temperature on the effluent production potential of grass silage 343
OLDENBURG E. Endophytic fungi and alkaloid production in perennial ryegrass in Germany 425
OSORO K. *see* DEL POZO M.

PALMER S.C.F. Prediction of the shoot production of heather under grazing in the uplands of Great Britain 408
PATTERSON D.C., MAYNE C.S., GORDON F.J. and KILPATRICK D.J. An evaluation of an inoculant/enzyme preparation as an additive for grass silage for dairy cattle 325
PATTERSON D.C. *see* WRIGHT D.A.

RACKHAM D. *see* GOODING R.F.
REED K.F.M. *see* SMITH K.F.
REES M.E. *see* MAXWELL T.J.
REID D. Malcolm E. Castle: an appreciation
RIHAWI S. *see* WHITE P.F.
ROBERTSON D. *see* GOODING R.F.
ROOK A.J. *see* GIBB M.J.
ROYO C. Grain yield and yield components as affected by forage removal in winter and spring triticale 63

SAVOIE P. *see* CHARMLEY E.
SCHENK U., JÄGER H.-J. and WEIGEL H.-J. The response of perennial ryegrass/white clover mini-swards to elevated atmospheric CO_2 concentrations: effects on yield and fodder quality 232
SCHLEPERS H. *see* ELGERSMA A.
SIBBALD A.R. *see* MAXWELL T.J.
SMITH K.F., REED K.F.M. and FOOT J.Z. An assessment of the relative importance of specific traits for the genetic improvement of nutritive value in dairy pasture 167
SMITH M.A. *see* MARRIOTT C.A. 156
SOUSSANA J.F. *see* LOUAULT F.
STOUT D.G., BROOKE B., HALL J.W. and THOMPSON D.J. Forage yield and quality from intercropped barley, annual ryegrass and different annual legumes 298
SVANÅNG K. *see* FRANKOW-LINDBERG B.E.
SVEISTRUP T.E. and HARALDSEN T.K. Effects of soil compaction on root development of perennial grass leys in northern Norway 381
SWIFT G. *see* VIPOND J.E.

TAMMINGA S. *see* CHILIBROSTE P.
TERMANINI A. *see* WHITE P.F.
THOMPSON D.J. *see* STOUT D.G.
TOLMAY E. *see* CILLIERS J.W.
TORVELL L. *see* COMMON T.G.
TREACHER T.T. *see* WHITE P.F.

VAGNONI D.B., BRODERICK G.A. and MUCK R.E. Preservation of protein in wilted lucerne using formic, sulphuric or trichloroacetic acid
VALENTINE I. *see* NIE Z.N.
VAN BILJON P.L. *see* CILLIERS J.W.
VENUTO B.C., JOOST R.E., HINTZ R.W. and CHANEY C.R. Differential red clover germplasm response to defoliation and fungicide application (Research Note) 449
VIPOND J.E., SWIFT G., CLELAND A.T., FITZSIMONS J. and HUNTER E.A. A comparison of diploid and tetraploid perennial ryegrass and tetraploid ryegrass/white clover swards under continuous sheep stocking at controlled sward heights. 3. Sward characteristics and animal output, years 4–8 99

WEIGEL H.-J. *see* SCHENK U.
WHITE P.F., TREACHER T.T., TERMANINI A. and RIHAWI S. The accuracy of using the ratio of nitrogen to acid detergent fibre in faeces to partition nitrogen between faeces and urine in total excreta collections from ewes 122
WHYTE T.K. *see* DEL POZO M.
WIGHTMAN P.S., FRANKLIN M.F. and YOUNIE D. The effect of sward height on responses of mini-swards of perennial ryegrass/white clover to slurry application 42
WILLIAMS A.G., HOXEY R.P. and LOWE J.F. Changes in temperature and silo gas composition during ensiling, storage and feeding-out grass silage 176
WILLIAMS A.G. *see* O'DONNELL C.
WRIGHT D.A., FROST J.P., PATTERSON D.C. and KILPATRICK D.J. The influence of weight of ryegrass per unit area and treatment at and after mowing on rate of drying 86
WRIGHT I.A. *see* DEL POZO M.

WU L., MCGECHAN M.B. and KNIGHT A.C. Simulation of allocation of accumulated biomass to leaf and stem in a grass growth model (Research Note) 445

YOUNIE D. *see* WIGHTMAN P.S.